

ABSTRACT OF THE DISCLOSURE

In order to emit a light from an electrode side, in semiconductor light emitting devices such as LED and the like, and liquid crystal, the electrode is formed of a transparent material so as to transmit a light through the transparent electrode and exit the light. A ZnO, which constitutes a material for the transparent electrode, is subject to erosion by acid and alkali, thus, as the case may cause loss of a reliability of the electrode under the influence of ion-containing moisture. In order to solve such a problem, this invention has as its aim a transparent electrode film provided with stability capable of preventing any degradation under the influence of any ion-containing moisture, while being kept acid-proof and alkali-proof. In order to accomplish the above-mentioned aim, this invention provides a transparent electrode made up of a ZnO as its main material, wherein its surface is covered with a Mg-doped ZnO film.